



PULIZZI ENGINEERING INC.

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PC 975: 120/208V~ WYE 3Ø, 50/60 Hz, 30A



PC975 Pictured

cUL US
 UL/CUL 1950 2nd Edition File #: E 94081

RACK MOUNTED

- EIA standard for 19" racks
- Hole spacing to IEC 297
- Height 3.5" (2U) x Depth 12.0" excluding 2.5" recess mounting.
- Optional mounting brackets for flush mount.
- 16 GA. Steel, Zinc Plated
- Approximate shipping weight 29 lbs.
- Pulizzi recommends chassis support brackets, from your cabinet supplier, should be utilized.

11 NEMA OUTLETS

- 2 NEMA 5-20R unswitched outlets
- Per phase: 1 NEMA L6-20R (208V~) and 2 NEMA 5-20R (120V~) outlets
- Other NEMA outlets are optional

4 INDICATOR LIGHTS

- Main breaker power "on" to system and unswitched duplex
- Power "on" to PH-X outlets
- Power "on" to PH-Y outlets
- Power "on" to PH-Z outlets

EMI/RFI FILTERING

- Common Mode - Line to Ground
- Differential Mode - Line to Line
- High Frequency Ground Isolation

SPIKE/SURGE SUPPRESSION

- Line to Neutral
- Line to Ground
- Neutral to Ground

OVERLOAD CIRCUIT PROTECTION

- Precision electromagnetic breakers, with a long time delay curve, provide both manual on/off switching and open (trip) automatically with an overload condition.
- Kick Guard's are optional.

LOCAL/OFF/REMOTE SWITCHING

- Select to have all switched outlets "off" with unswitched "on"
- Select to "locally" control power "on/off" to the switched outlets.
- Select to "remotely" control power "on/off" to the switched outlets.

MULTIPLE TIME DELAY™ (MTD™)

- When activated "locally" or "remotely", PH-X outlet's power up immediately, followed approximately four seconds later by the PH-Y outlets which is followed four seconds later by the PH-Z outlets.

4 REMOTE I/O PORTS

- 2 on front and 2 on rear panel
 - mechanical closure required
- Remote on/off control
- Emergency Power Off (EPO)
 - EPO overrides remote and local on/off control
- Power Up additional equipment down line with a 4 second time delay.
- OPTON: Latching remote – momentary start and N/C EPO.

POWER INPUT

- Power cable with plug is attached to unit through the cable grip on the front panel.

SPECIFICATIONS FOR:	PC 975	PC 975-1969	PC 975-2109
Voltage Input 3Ø (50/60Hz):	120/208V	120/208V	120/208V
Voltage Output 1Ø (50/60Hz):	120V~ and 208V~	120V~ and 3Ø 120/208V~	120V~
Current Input per phase:	30A per phase	30A per phase	30A per phase
Current Output De-rated per phase:	24A per phase	24A per phase	24A per phase
Full Load Volt/AMP De-rated all phases:	8640VA	8640VA	8640VA
Main Circuit Breaker (on/off switch):	4pole 30/30/30/30	4pole 30/30/30/30	4pole 30/30/30/30
Secondary Circuit Breakers per phase:	2pole 20/20	N/A	20
Unswitched Duplex Circuit Breaker:	20A thermal reset	20A thermal reset	15A thermal reset
EMI/RFI Filter:	30A	30A	30A
NEMA Outlets:	5-20R and L6-20R	5-20R and L21-30R	5-15R and L5-30R
Power Cord/Length:	10/5, 15'	10/5, 15'	10/5, 15'
NEMA Power Input Plug:	L21-30P	L21-30P	L21-30P

MULTI-STAGE SPIKE AND SURGE SUPPRESSION

Response time is approximately 50 nanoseconds. Exceeds recommended specifications for High Exposure Areas per ANSI/IEEE C62.41-1980, Class B.
CAUTION: If the ground MOV's are exposed to an improper voltage level, they will fail. Please check your power source for proper wiring prior to plugging in the PEI system.

MAXIMUM RATINGS (85°C)				CHARACTERISTICS (25°C)					
CONTINUOUS		TRANSIENT		VARISTOR			MAXIMUM		TYPICAL
RMS VOLTAGE	DC VOLTAGE	ENERGY (10/100µS)	PEAK CURRENT (8/20µS)	VOLTAGE @1 mA DC TEST CURRENT			CLAMPING VOLTAGE V _C @ TEST CURRENT (8/20µS)		CAPACITANCE
V _{m(ac)}	V _{M(dc)}	W _{tm}	I _{tm}	MIN.	V _{N(de)}	MAX.	V _C	I _p	f=0.1 - 1MHz
VOLTS	VOLTS	JOULES	AMPS	VOLTS	VOLTS	VOLTS	VOLTS	AMPS	PICOFARADS
(3) 320V L-N on the input side of filter and (3) 275V L-N, L-G, N-G for the 208V output and (3) 150V L-N, L-G, N-G for the 120V output.									
320	420	160	6500	462	510	540	810	100	750
275	369	140	6500	389	430	453	680	100	900
150	200	80	6500	212	240	243	360	100	1600

EMI/RFI FILTERING:

Operating Voltage: 250V~/440V~ WYE
Operating Current: 30A per phase
Operating Frequency: 50/60 Hz.
Operating Temperature: -10 to 50 C
Dielectric Withstanding: Line to Case 1500V~
Dielectric Withstanding: Line to Line 1500 VDC
Leakage Current: 2.0mA @ 250VRMS, 60 Hz
Maximum Residual Volts After 1 Second: 34V
UL and CSA approved.

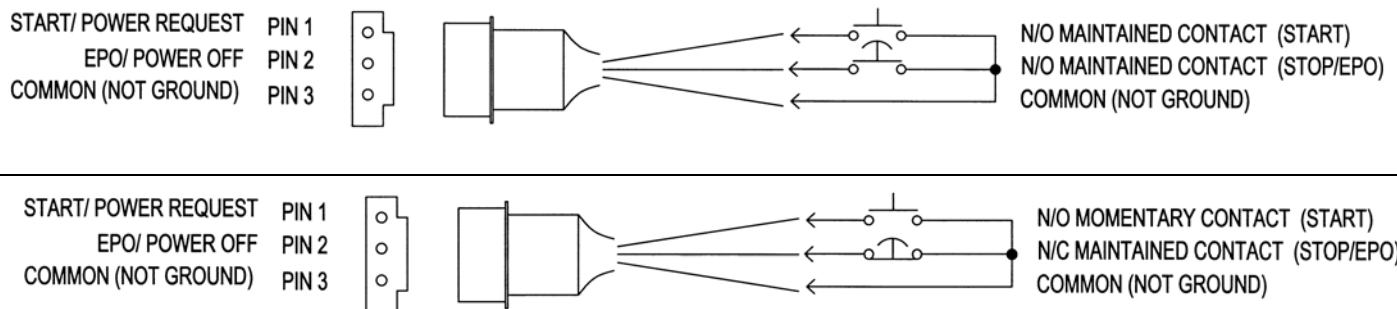
COMMON MODE INSERTION LOSS: Line-Ground

Mhz.	.05	.20	1.0	5.0	20.0	100.0
dB.:	0	35	71	75	66	48

DIFFERENTIAL MODE INSERTION LOSS: Line-Line

Mhz.	.05	.20	1.0	2.0	5.0	10.0
dB.:	20	30	72	63	58	51

This is the standard 3-wire Power Control Interface for units that utilize the 340 controller board. When the Remote/Off/Local Switch is in remote mode, a maintained closure between Pins 1 and 3 will turn the switched outlets "on", providing that Pins 2 and 3 are open. A maintained closure between Pins 2 and 3 will remove power from the switched outlets, **regardless** of the position of the Remote/Off/Local switch. Also, opening the closure between Pins 1 and 3 will remove power from the switched outlets. PDU's linked together through the remote I/O Ports are controlled by the main PDU. If any PDU in the chain has a Power Shutdown occurrence, i.e. a maintained closure between Pins 2 and 3 occurs, all PDU's will remove power from the switched outlets. If Pins 2 and 3 are again opened, all units will start their power up sequence. When a PDU has a sequenced remote port incorporated, be sure to link units together by connecting from the sequenced port of one unit to a non-sequenced port of the next unit. The Open Circuit voltage between Pins 1 and 3 or 2 and 3 on 340 and 345 boards is +5VDC. Short circuit current on Pins 1 and 2 is approximately 50 mA. Products that utilize the 333 control board work as stated above except that the Open Circuit voltage between Pins 1 and 3 or 2 and 3 is +12VDC. The short circuit current on Pin 1 is approximately 50 mA, and on Pin 2 is approximately 20 mA. The connections for the Power Control Interface is shown below along with a sample remote circuit. The RCP 100 or RCP 200 are standard remote panels designed for the PDU's with this remote circuit. The female AMP connectors used in the "Z-Line®" Power Controllers are AMP Part Number 1-480304-0, and are used with AMP Socket Terminals, Part Number 60619-1. The mating male AMP connector is AMP Part Number 1-480305-0, and are used with AMP male contacts, Part Number 60620-1. The cable assemblies should be made with three conductor 14-20 AWG stranded wire and terminated to the AMP connectors. **CAUTION: THIS IS NOT INTENDED AS A SUBSTITUTE FOR A SAFETY INTERLOCK !**



Optional Remote Latch (add -LT or /LT to end of part number): A momentary closure replaces the standard maintained closure for remote power "on". LT units are designed for remote operation only. Even when the remote/off/local switch is in the local mode, the unit still requires a power request from the remote ports to turn "on" the unit. Therefore, the remote/off/local switch becomes remote/off/remote. Remote start requires two conditions: (1) Maintained contact between pins 2 & 3 (N/C EPO) and (2) Momentary contact between pins 1 & 3 (N/O Start). Opening the closure between pins 2 & 3, removes power to the switched outlets regardless of the remote switch position. A maintained closure, instead of a momentary closure, can be used between pins 1 & 3 for power "on" to the switched outlets so long as the EPO connection between pins 2 and 3 is engaged. Units can be linked together through the Sequenced I/O port (pins 1 & 2) of one unit to a non-sequenced I/O port (pins 1 & 2) of the next unit. If any PDU in the chain has a Power Shutdown (EPO - opening between pins 2 & 3) only the PDU's from the point of EPO and down will have power remove from their switched outlets. Any PDU's in the chain above the point of the EPO occurrence will remain "on". The only way in an LT unit to have all PDU's in a chain power "off" during an EPO occurrence would be to route all EPO devices to the main PDU. To power back up after an EPO, a momentary latch start between pins 1 & 3 is required as well as a maintained closure between pins 2 & 3 prior to the latch start. The open circuit voltage on pin 2 referenced to ground is +12VDC. The voltage potential between pin 1 and 3 is 12VDC when the EPO is closed, and Zero VDC when the EPO is open. Short circuit current on pin 2 is approximately 250mA. LT units require either the 345 board or a combination of the 4000 and 346 boards. The connections for the EPO Interface are shown below along with a sample remote circuit. The RCP 100-LT or RCP 200-LT are standard remote panels designed for the PDU's with the latching option. The female AMP connectors used in the "Z-Line®" Power Controllers are AMP Part Number 1-480304-0, and are used with AMP Socket Terminals, Part Number 60619-1. The mating male AMP connector is AMP Part Number 1-480305-0, and are used with AMP male contacts, Part Number 60620-1. The cable assemblies should be made with three conductor 14-20 AWG stranded wire and terminated to the AMP connectors.